

## REMARKS

Favorable reconsideration of this application is respectfully requested in view of the following remarks.

At the outset, Applicants appreciate the courtesies shown to Applicants' representative by Examiner Milia during the August 26, 2009 telephone interview. The reasons warranting favorable action discussed during the interview are incorporated into the following remarks and constitute Applicants' separate record of the substance of the interview.

Claims 1-14, 16-35, 37 and 38 are pending in this application. Claims 1, 8, 16, 18, 27 and 37 are independent. By this Amendment, independent the independent claims are amended as discussed during the interview. Support for the amendments can be found, for example, in paragraphs [0124] and [0125] of the published U.S. application. No new matter is added.

Claims 1-3, 5-10, 12-14, 16 and 17 stand rejected under 35 U.S.C. §102(b) over Hohensee et al. ("Hohensee"), U.S. Patent No. 6,407,821. The rejection is respectfully traversed.

Independent Claim 1 is directed to an image forming device for receiving a document file that has not been converted into print data and forming images of the document file. The document file contains a plurality of pages and a plurality of unconverted objects for displaying a part or all of the contents of each page of the document and is capable of lining up in the file regardless of the order of the contents displayed in the document. The image forming device includes a receiving unit for successively receiving unconverted constituent data of the document file, a storing unit for successively storing the objects contained in the unconverted constituent data received by the receiving unit, a judging unit for judging whether all

objects necessary for displaying a specific page out of a plurality of objects included in a document file are stored in a storing unit, and an image forming unit for forming images of the specific page before all of the unconverted constituent data of the document file have been received at the receiving unit when it is judged by the judging unit that all objects necessary for displaying the specific page are stored in the storing unit regardless of whether the plurality of objects included in the document file have been stored in the storing unit or not. Independent Claims 8 and 16 recite similar features and aspects.

As discussed during the telephone interview, Hohensee discloses that all pages of a file are processed to determine if all of the resources needed to print the pages are present. When all of the resources are determined to be present, PDF data is rasterized and merged with other print data, and printed out. However, as tentatively agreed during the telephone interview, Hohensee fails to disclose that the printer 224 forms images of a specific page before all of the unconverted constituent data of the document file have been received at a receiving unit when it is judged that all objects necessary for displaying the specific page are stored in a storing unit regardless of whether the plurality of objects included in the document file have been stored, as recited in independent Claim 1 and similarly recited in independent Claims 8 and 16. Thus, as tentatively agreed during the telephone interview, independent Claims 1, 8 and 16 are patentable over Hohensee for at least these reasons.

In addition, the Office Action asserts that data received by Hohensee's printer 224 has not been converted into print data. Applicants respectfully disagree.

As discussed during the interview, Hohensee discloses a printing system for printing a document produced by an application program 204 that generates a data stream which contains page description information such as EPS and PDF objects

(see Fig. 2 and col. 4, line 61 to col. 5, line 2 of Hohensee). The page description information is provided to a **conversion program** 206 that generates a data stream 214 which is a formatted logical description of the print document (see Fig. 2 and col. 5, lines 3-6). In the process of forming the data stream, the conversion program stores information, such as fonts and formatting information for printing, in a resource database 210 (see Fig. 2 and col. 5, lines 6-11). The conversion program then generates a logical description of the document with references to information stored in the resource database 210 for printing in an MO:DCA file format in an AFP system (see Fig. 2 and col. 5, lines 11-15).

As discussed during the interview, the print data in MO:DCA format is stored in a spool 212, which stores and spools the MO:DCA data stream 214 representing the print document from the conversion program 206 (see Fig. 2 and col. 5, lines 16-21). A spooled output data stream 216 is transmitted to a print server 218 that **converts** the print specifications to a device specific data stream by means of a printer driver 220 and the resource database 210 (see Fig. 2, col. 5, lines 25-29; col. 8, lines 26-32 and col. 11, lines 36-45). The resource database 210 **converts** the MO:DCA data stream into a print data stream 222 including details of a physical medium, and the resulting **converted** data stream 222 is sent to the printer 224 (see Fig. 2 and col. 5, lines 29-35; col. 8, lines 26-32 and col. 11, lines 36-45).

As is clear from at least the above mentioned passages of Hohensee, the data received by Hohensee's printer 224 has been converted into print data, as discussed during the interview. Thus, Hohensee fails to disclose an image forming device that receives a document file which has not been converted into print data, and that includes a receiving unit for successively receiving unconverted constituent data of the document file and a storing unit for successively storing the objects

contained in the unconverted constituent data received by the receiving unit, as recited in independent Claim 1 and similarly recited in independent Claims 8 and 16.

The Examiner said during the interview that he is interpreting the claimed document file as a PDF file corresponding to Hohensee's PDF page data 824 which he says is converted to print data after being received by the printer 224 (see col. 5, lines 36-51 and col. 11, lines 36-52 of the Hohensee patent). However, as discussed during the interview, Hohensee's printer 224 still receives image file data that has already been converted into print data, regardless of whether the PDF page data 824 is converted to print data after being received by the printer 224. Accordingly, Hohensee fails to disclose the claimed image forming device because Hohensee's conversion program 206 and resource database 210 convert page description information into print data as discussed in col. 5, lines 3-35 of Hohensee. Therefore, independent Claims 1, 8 and 16 are patentable over Hohensee for at least these additional reasons.

Claims 2, 3, 5-7, 9, 10, 12-14 and 17 are patentable over Hohensee at least by virtue of their dependence from patentable independent Claims 1, 8 and 16, respectively. Thus, a detailed discussion of the additional distinguishing features recited in these dependent claims is not set forth at this time. Withdrawal of the rejection is respectfully requested.

The Office Action rejects Claims 4 and 11 under 35 U.S.C. §103(a) over Hohensee in view of Abe, JP-A-09-174955. The rejection is respectfully traversed.

Claims 4 and 11 are patentable over Hohensee and Abe at least by virtue of their dependence from patentable independent Claims 1 and 8, respectively. Thus, a detailed discussion of the additional distinguishing features recited in these

dependent claims is not set forth at this time. Withdrawal of the rejection is respectfully requested.

The Office Action rejects Claims 18, 19, 23-28, 32-35, 37 and 38 under 35 U.S.C. §103(a) over Hohensee in view of Abe. The rejection is respectfully traversed.

Independent Claim 18 is directed to an image forming device for receiving a document file that has not been converted into print data and forming images of the document file. The document file contains unconverted objects for displaying a part or all of the contents of each page of the document and is capable of lining up in the file regardless of the order of the contents displayed in the document. The image forming device includes, *inter alia*, a receiving unit for successively receiving constituent data of the document file before the constituent data is converted into print data, a storing unit for successively storing the objects contained in the constituent data before the constituent data is converted into print data, and an image forming unit for forming images of the objects stored in the storing unit either singly or in combination of two or more of them before all of the unconverted constituent data of the document file have been received at the receiving unit and regardless of the order displayed in the document when it is judged that the amount of usage of the storing unit has exceeded the prescribed limit. Independent Claims 27 and 37 recite similar features and aspects.

As discussed above and tentatively agreed during the interview, Hohensee fails to disclose an image forming unit for forming images of the objects stored in the storing unit either singly or in combination of two or more of them before all of the unconverted constituent data of the document file have been received at the receiving unit and regardless of the order displayed in the document when it is

judged that the amount of usage of the storing unit has exceeded the prescribed limit, as recited in independent Claim 18 and similarly recited in independent Claims 27 and 37. Further, Abe fails to overcome the deficiencies of Hohensee. Thus, independent Claims 18, 27 and 37 are patentable over the combination of Hohensee and Abe for at least these reasons.

In addition, Hohensee discloses that the information received by Hohensee's printer 224 has been converted into print data, as discussed during the interview. Thus, Hohensee fails to disclose an image forming device that receives a document file which has not been converted into print data, and that includes a receiving unit for successively receiving constituent data of the document file *before the constituent data is converted into print data*, and a storing unit for successively storing the objects contained in the constituent data *before the constituent data is converted into print data*, as recited in independent Claim 18 and similarly recited in independent Claims 27 and 37. Abe also fails to overcome these deficiencies of Hohensee. Therefore, independent Claims 18, 27 and 37 are patentable over the combination of Hohensee and Abe for at least these additional reasons.

Claims 19, 23-26, 28, 32-35 and 38 are patentable over Hohensee and Abe at least by virtue of their dependence from patentable independent Claims 18, 27 and 37, respectively. Thus, a detailed discussion of the additional distinguishing features recited in these dependent claims is not set forth at this time. Withdrawal of the rejection is respectfully requested.

The Office Action rejects Claims 20-22 and 29-31 under 35 U.S.C. §103(a) over Hohensee in view of Abe, and further in view of Brown et al. ("Brown"), U.S. Patent Application Publication No. 2004/0216048 A1. The rejection is respectfully traversed.

Claims 20-22 and 29-31 are patentable over the applied references at least by virtue of their dependence from patentable independent Claims 18 and 27, respectively. Thus, a detailed discussion of the additional distinguishing features recited in these dependent claims is not set forth at this time. Withdrawal of the rejection is respectfully requested.

Should any questions arise in connection with this application or should the Examiner believe that a telephone conference with the undersigned would be helpful in resolving any remaining issues pertaining to this application the undersigned respectfully requests that he be contacted at the number indicated below.

Respectfully submitted,

BUCHANAN INGERSOLL & ROONEY PC

Date: August 27, 2009

By:

  
David R. Kemeny  
Registration No. 57241

P.O. Box 1404  
Alexandria, VA 22313-1404  
703 836 6620